

REMARKS

Claims 1-5, 9-12, 16-21, 26-27, and 28-41 are pending in this application. For purposes of expedition, claims 6-8, 13-15 and 23-25 have been canceled without prejudice or disclaimer. Claims 8, 15 and 25, which have been conditionally allowed, have been canceled and their limitations have been incorporated into base claims 1, 2 and 16 in order to place base claims 1, 2 and 16 along with all dependent claims in condition for allowance. Claims 28-41 have been newly added in accordance with current Office policy, to capture the allowable subject matter and to alternatively define Applicants' disclosed invention in order to place all claims in condition for allowance. Accordingly, entry of the foregoing amendments is proper under 37 C.F.R. §1.116(b) because those amendments simply respond to the issues raised in the final rejection, no new issues are raised, no further search is required, and the foregoing amendments are believed to remove the basis of the outstanding rejections and to place all claims in condition for allowance. The foregoing amendments, or explanations, could not have been made earlier because these issues had not previously been raised.

Claims 8, 15 and 25 have been conditionally allowed if rewritten in independent form to include all of the limitations of their respective base claims 1, 2 and 16. The Examiner's indication of allowability of these claims is noted with appreciation. As previously discussed, claims 8, 15 and 25 have been canceled and their limitations have been incorporated into respective base claims 1, 2 and 16 in order to place in condition for allowance. Claims 28-41 have been newly added to capture the allowable subject matter. Accordingly, Applicants respectfully request

that the Examiner provide an indication of allowance with respect to all pending claims as amended and added herein.

Lastly, claims 1-7, 9-14, 16-24, 26 and 27 have been rejected under 35 U.S.C. §102(b) as being anticipated by newly cited prior art, Dill et al., U.S. Patent No. 6,023,395 for reasons stated on pages 2-4 of the final Office Action (Paper No. 6). While Applicants disagree with the Examiner's assessment of Dill '395, base claims 1, 2 and 16 have been amended to incorporate all limitations of allowed claims 8, 15 and 25 in order to render the rejection moot and to place all claims in condition for allowance.

Claims 28-41 have been newly added to capture the allowable subject matter and to alternatively define Applicants' disclosed invention relative to cited prior art. In addition, base claims 28, 31, 34 and 37 further define that single magnetic turning ferromagnetic layer is composed of a three layered structure, i.e., hard magnetic film 414/coupling film 415, soft magnetic film 416. The advantage of such a three layer structure is that the soft magnetic film absorbs a magnetic field generated by the dispersion of the magnetization of the hard magnetic film and prevents the deterioration of the magnetic characteristics of the soft magnetic free layer, as described on page 33, lines 17-22, and page 38, lines 15-20 of Applicants' original specification.

In contrast to Applicants' claims 28-41, Dill '395 discloses a two layered structure of biasing ferromagnetic layer 150 as described on column 12, lines 40-52, and as shown in FIGs. 4A-4B and FIG. 6. Specifically, Dill '395 describes that

"the biasing ferromagnetic layer may be formed from a single layer of a high coercivity material such as an alloy of Co and one or more other elements, such as Co-Pt binary alloy, or a Co-Pt-Cr ternary alloy (e.g., Co₇₅Pt₁₂Cr₁₃) or a Co-Pt-Ni ternary alloy or a Co-Cr-Ta

ternary alloy. In addition to using a single layer of high coercivity material, such as CoPtCr, as the biasing ferromagnetic layer, there are two other structures that will serve as the biasing ferromagnetic layer. First, the biasing ferromagnetic layer may be a bilayer formed from a first ferromagnetic film of a lower coercivity material, such as 5 nm of Ni-Fe, and a second ferromagnetic film of a higher coercivity material, such as 10 nm of CoPtCr."

As described above, Dill '395 does **not** disclose the use of a three-layered structure as defined in Applicants' claims 28-41.

In view of the foregoing amendments, arguments and remarks, all claims 1-5, 9-12, 16-21, 26-27, and 28-41 are deemed to be allowable and this application is believed to be in condition to be passed to issue. Should any questions remain unresolved, the Examiner is requested to telephone Applicants' attorney at the Washington DC area office at (703) 312-6600. Applicants respectfully reserve all rights to file subsequent related application(s) (including reissue applications) directed to any or all previously claimed limitations/features which have been amended or canceled, or to any or all limitations/features not yet claimed, i.e., Applicants have no intention or desire to dedicate or surrender any limitations/features of the disclosed invention to the public.

INTERVIEW:

In the interest of expediting prosecution of the present application, Applicants respectfully request that an Examiner interview be scheduled and conducted. In accordance with such interview request, Applicants respectfully request that the Examiner, after review of the present Amendment, contact the undersigned local Washington, D.C. area attorney at the local Washington, D.C. telephone number (703) 312-6600 for scheduling an Examiner interview, or alternatively, refrain from

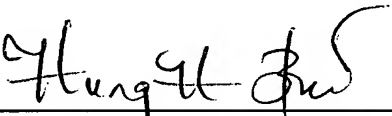
issuing a further action in the above-identified application as the undersigned attorneys will be telephoning the Examiner shortly after the filing date of this Amendment in order to schedule an Examiner interview. Applicants thank the Examiner in advance for such considerations. In the event that this Amendment, in and of itself, is sufficient to place the application in condition for allowance, no Examiner interview may be necessary.

To the extent necessary, Applicants petition for an extension of time under 37 CFR §1.136. Please charge any shortage of fees due in connection with the filing of this paper, including extension of time fees, to the Deposit Account of Antonelli, Terry, Stout & Kraus, No. 01-2135 (Application No. 520.41222X00), and please credit any excess fees to said deposit account.

Respectfully submitted,

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